

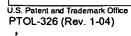
United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERGE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/717,118	11/19/2003	Henryk Sowul	GP-303137	7285
7590 03/30/2005			EXAMINER	
General Motors Corporation			HO, HA DINH	
Legal Staff	•			
Mail Code 482-C23-B21			ART UNIT	PAPER NUMBER
P.O. Box 300			3681	
Detroit, MI 48265-3000			DATE MAILED: 03/30/2005	

Please find below and/or attached an Office communication concerning this application or proceeding.

		·				
	,	Application No.	Applicant(s)			
	Office Action Summary	10/717,118	SOWUL ET AL.			
V		Examiner	Art Unit			
		Ha D. Ho	3681			
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1)⊠	1) Responsive to communication(s) filed on 19 November 2003.					
2a)□	This action is FINAL . 2b) This action is non-final.					
3)□	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
	closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.					
Disposit	ion of Claims					
4)⊠	4) Claim(s) 1-6 is/are pending in the application.					
,—	4a) Of the above claim(s) is/are withdrawn from consideration.					
5)□	5) Claim(s) is/are allowed.					
· <u> </u>	6)⊠ Claim(s) <u>1-6</u> is/are rejected.					
7)	Claim(s) is/are objected to.					
8)[Claim(s) are subject to restriction and/or election requirement.					
Application Papers						
9)[\inf	The specification is objected to by the Examine	r.				
10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11)	11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.					
Priority	under 35 U.S.C. § 119					
12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a)☐ All b)☐ Some * c)☐ None of:						
·	1. Certified copies of the priority documents have been received.					
	2. Certified copies of the priority documents have been received in Application No					
	3. Copies of the certified copies of the priority documents have been received in this National Stage					
	application from the International Bureau (PCT Rule 17.2(a)).					
*	See the attached detailed Office action for a list	of the certified copies not receive	ed.			



Paper No(s)/Mail Date ___

Attachment(s)

Notice of References Cited (PTO-892)
 Notice of Draftsperson's Patent Drawing Review (PTO-948)
 Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)

4) Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
5) Notice of Informal Patent Application (PTO-152)
6) Other: ____.

Application/Control Number: 10/717,118

Art Unit: 3681

DETAILED ACTION

1. This is the first Office Action on the merits of Application No. 10/717,118 filed on 11/19/03. Claims 1-6 are currently pending.

Specification

2. Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

3. The abstract of the disclosure is objected to because of using the legal phraseology, i.e., "said" in lines 3 and 6. Correction is required. See MPEP § 608.01(b).

Claim Rejections - 35 USC § 112

- 4. The following is a quotation of the second paragraph of 35 U.S.C. 112:
 - The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 5. Claim 6 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Page 2

Application/Control Number: 10/717,118

Art Unit: 3681

Claim 6 recites the limitation "said reduction gear mechanism" in line 5. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

Page 3

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 7. Claims 1, 2, 5 and 6 are rejected under 35 U.S.C. 102(b) as being anticipated by Buschhaus et al. (US 5,713,425).

Buschhaus et al show a hybrid powertrain (see Fig. 1) comprising:

a prime mover engine (10), a multi-ratio transmission (14-24) driven by said prime mover;

a gear transfer mechanism (52) between said transmission and a plurality of vehicle drive wheels, and

an electric power unit (46) drivingly connected with said gear transfer mechanism in parallel power flow (the power flow along the shaft 30) relation with an output power flow (the power flow along the shaft 22) from said transmission.

Art Unit: 3681

Regarding claim 2, wherein said electric power unit incorporates a reduction gear mechanism (40, 42) between an output member (44) of said electric power unit and said gear transfer mechanism.

Regarding claim 5, wherein said electric power unit has a centerline (the axis of shaft 44) disposed in perpendicular relationship with a centerline of said transmission (14-24) (the centerline that is parallel to the shafts 14 and 22).

Regarding claim 6, wherein a transfer gearing mechanism (28) is disposed between said transmission (14-24) and said driven wheels of a vehicle, and said electric power unit provides an input drive through a reduction gearing (40, 42) to a reduction gear mechanism (52) and therefore to said driven wheels of said vehicle through a power path (the power path along the shaft 30) parallel with a power path (the power flow along the shaft 22) from said transmission.

8. Claims 1, 2, 4 and 6 are rejected under 35 U.S.C. 102(b) as being anticipated by Bowen et al. (US 6,464,608).

Bowen et al show a hybrid powertrain comprising:

a prime mover engine (12), a multi-ratio transmission (14, 56) driven by said prime mover;

a gear transfer mechanism (46 or 36) between said transmission and a plurality of vehicle drive wheels (42 or 32), and

an electric power unit (22) drivingly connected with said gear transfer mechanism in parallel power flow (the power flow along the shaft 84) relation with an output power flow (the power flow along the shaft 40) from said transmission.

Regarding claim 2, wherein said electric power unit incorporates a reduction gear mechanism (58) between an output member (the motor output shaft between the rotor 120 and the sun gear 112) of said electric power unit and said gear transfer mechanism.

Regarding claim 4, wherein said electric power unit has a centerline (the axis of the rotor 120) disposed in parallel relationship with a centerline of said transmission (the axis of shaft 40).

Regarding claim 6, wherein a transfer gearing mechanism (60) is disposed between said transmission (14, 56) and said driven wheels of a vehicle, and said electric power unit provides an input drive through a reduction gearing (112, 114) to a reduction gear mechanism (116, 84, 82, 86) and therefore to said driven wheels of said vehicle through a power path (the power path along the shaft 84) parallel with a power path (the power flow along the shaft 40) from said transmission.

9. Claims 1-4 and 6 are rejected under 35 U.S.C. 102(e) as being anticipated by Maruyama (US 6,640,917).

Maruyama shows a hybrid powertrain (see Fig. 3) comprising:

a prime mover engine (2), a multi-ratio transmission (13-16) driven by said prime mover;

a gear transfer mechanism (6) between said transmission and a plurality of vehicle drive wheels (4), and

an electric power unit (3) drivingly connected with said gear transfer mechanism in parallel power flow (the power flow along the shaft 3a) relation with an output power flow (the power flow along the shaft 12) from said transmission.

Application/Control Number: 10/717,118

Art Unit: 3681

Regarding claim 2, wherein said electric power unit incorporates a reduction gear mechanism (8) between an output member (3a) of said electric power unit and said gear transfer mechanism.

Page 6 -

Regarding claim 3, wherein said electric power unit incorporates a reduction gearing (8) disposed to provide input drive to said gear transfer mechanism through a selectively engageable torque-transmitting mechanism (23).

Regarding claim 4, wherein said electric power unit has a centerline (the axis of the shaft 3a) disposed in parallel relationship with a centerline of said transmission (the axis of shaft 11).

Regarding claim 6, wherein a transfer gearing mechanism (17) is disposed between said transmission (13-16) and said driven wheels of a vehicle, and said electric power unit provides an input drive through a reduction gearing (8) to a reduction gear mechanism (24, 6a) and therefore to said driven wheels of said vehicle through a power path (the power path along the shaft 3a) parallel with a power path (the power flow along the shaft 11) from said transmission.

Cited Prior Art

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure: Kriebler et al'189, Yamada et al.'877, Nedungadi t al.'066, and Toyoda et al'326 which each shows a hybrid vehicle including an electric motor and reduction gear unit.

Communication

11. Submission of your response by facsimile transmission is encouraged. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9326 for regular communications and (703) 872-9327 for After Final communications. Recognizing the fact that reducing cycle time in the processing and examination of patent applications will effectively increase a patent's term, it is to your benefit to submit responses by facsimile transmission whenever permissible. Such submission will place the response directly

Art Unit: 3681

in our examining group's hands and will eliminate Post Office processing and delivery time as well as the PTO's mail room processing and delivery time. For a complete list of correspondence not permitted by facsimile transmission, see M.P.E.P. 502.01. In general, most responses and/or amendments not requiring a fee, as well as those requiring a fee but charging such fee to a deposit account, can be submitted by facsimile transmission. Responses requiring a fee which applicant is paying by check should not be submitting by facsimile transmission separately from the check. Responses submitted by facsimile transmission should include a Certificate of Transmission (M.P.E.P.. 512). The following is an example of the format the certification might take:

I hereby certify that this correspondence	is being facsimile transmitted to
the Patent and Trademark Office on	
	Date)
Typed or printed name of person signing	g this certificate:
	
(Signature)	

If your response is submitted by facsimile transmission, you are hereby reminded that the original should be retained as evidence of authenticity (37 CFR 1.4 and M.P.E.P.. 502.02). Please do not separately mail the original or another copy unless required by the Patent and Trademark Office. Submission of the original response or a follow-up copy of the response after your response has been transmitted by facsimile will only cause further unnecessary delays in the processing of your application; duplicate responses where fees are charged to a deposit account may result in those fees being charged twice.

Any inquiry concerning this communication or earlier communication from the examiner should be directed to Examiner Ho whose telephone number is (703) 305-0738 (or 571-272-7091 after April 2005). The examiner can normally be reached on Monday-Friday from 7:30 A.M. to 5:00 P.M. Eastern Standard Time. If attempts to reach the examiner by phone are unsuccessful, the examiner's supervisor, Mr. Charles Marmor, can be reached at (703) 308-0830 (or 571-272-7095 after April 2005).

12. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

HDH (703) 305-0738 March 18, 2005 HAHO
PRIMARY EXAMINER:
Art Unit 3681 3/18/05